

Amendments To The Claims:

This listing of claims will replace the previously filed claims in the application:

1. (Currently Amended): A helical end mill comprising a body having a circumferential face disposed about a rotational axis bearing a plurality of pockets for receiving cutting inserts, wherein the cutting inserts are arranged in at least two rows a first row and a second row and at least three columns on the circumferential face, wherein the angular spacing of the cutting inserts about the rotational axis within at least one of the rows the first row varies within the row, wherein the angular spacing of the cutting inserts within the second row varies within the row, wherein angular spacing is measured in a plane perpendicular to the rotational axis.

2. (Previously Presented): The helical end mill according to claim 1, wherein at least one cutting insert is positioned at a first rake angle, and at least one other cutting insert is positioned at a different rake angle.

3. (Previously Presented): The helical end mill according to claim 2, wherein the first rake angle and the different rake angle both comprise axial rake angles

4. (Previously Presented): The helical end mill according to claim 2, wherein the first rake angle and the different rake angle both comprise radial rake angles.

5. (Previously Presented): The helical end mill according to claim 4, wherein the lead cutting inserts of different columns display radial rake angles of greater magnitudes than the rake angles of at least some other cutting inserts.

6. (Previously Presented): The helical end mill according to claim 4, wherein lead cutting inserts of different columns and cutting inserts immediately adjacent to the lead cutting inserts have similar radial rake angles; and lead cutting inserts of different columns

and cutting inserts immediately adjacent to the lead cutting inserts each display radial rake angles of greater magnitudes than the rake angles of other cutting inserts.

7. (Previously Presented): The helical end mill according to claim 1, wherein the body has helical flutes disposed thereon, and each cutting insert is associated with one of the flutes.

8. (Previously Presented): The helical end mill according to claim 1, wherein each pocket is disposed to hold an installed insert such that the insert displays a clearance angle within the range of zero to twenty degrees.

9. (Previously Presented): The helical end mill according to claim 1, wherein at least one cutting insert is positioned at a first axial rake angle, and at least one other cutting insert is positioned at a different axial rake angle; and at least one cutting insert is positioned at a first radial rake angle, and at least one other cutting insert is positioned at a different radial rake angle.

10. (Currently Amended): The helical end mill according to claim 1, wherein at least one cutting insert is positioned at a first radial rake angle, and at least one other cutting insert is positioned at a different radial rake angle, and at least one cutting insert is positioned at a [[first]] first axial rake angle, and at least one other cutting insert is positioned at a different axial rake angle.

11. (Currently Amended): A helical end mill comprising a body having a circumferential face disposed about a rotational axis bearing a plurality of pockets for receiving cutting inserts, wherein the cutting inserts are arranged in at least a first row and a second row and at least three columns on the circumferential face, wherein the angular spacing of the cutting inserts about the rotational axis within the first row varies within the first row, and the angular spacing of the cutting inserts about the rotational axis within the second row varies within the second row and varies from the angular spacing of the cutting inserts about the rotational axis

within the first row, wherein angular spacing is measured in a plane perpendicular to the rotational axis

12. (Previously Presented): The helical end mill according to claim 11, wherein at least one cutting insert is positioned at a first rake angle, and at least one other cutting insert is positioned at a different rake angle.

13. (Previously Presented): The helical end mill according to claim 12, wherein the rake angle and the different rake angle both comprise axial rake angles.

14. (Previously Presented): The helical end mill according to claim 12, wherein the first rake angle and the different rake angle both comprise radial rake angles.

15. (Previously Presented): The helical end mill according to claim 14, wherein lead cutting inserts of different columns display radial rake angles of greater magnitude than the rake angles of at least some other cutting inserts.

16. (Previously Presented): The helical end mill according to claim 14, wherein lead cutting inserts of different columns and cutting inserts immediately adjacent to the lead cutting inserts have similar radial rake angles; and lead cutting inserts of different columns and cutting inserts immediately adjacent to the lead cutting inserts each display radial rake angles of greater magnitude than the rake angles of other cutting inserts.

17. (Previously Presented): The helical end mill according to claim 11, wherein the body has helical flutes disposed thereon, and each cutting insert is associated with one of the flutes.

18. (Previously Presented): The helical end mill according to claim 11, wherein each pocket is disposed to hold an insert such that the insert displays a clearance angle within the range of zero to twenty degrees.

19. (Previously Presented): The helical end mill according to claim 11, wherein at least one cutting insert is positioned at a first axial rake angle, and at least one other cutting insert is positioned at a different axial rake angle; and at least one cutting insert is positioned at a first radial rake angle, and at least one other cutting insert is positioned at a different radial rake angle.

20. (Previously Presented): The helical end mill according to claim 11, wherein at least one cutting insert is positioned at a first radial rake angle, and at least one other cutting insert is positioned at a different radial rake angle, and at least one cutting insert is positioned at a first axial rake angle, and at least one other cutting insert is positioned at a different axial rake angle